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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/624,607	07/23/2003	Kang-Seok Cho	1572.1135	7596

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EXAMINER

CASIANO, ANGEL L

ART UNIT PAPER NUMBER

2182

DATE MAILED: 05/04/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/624,607

Applicant(s)

CHO, KANG-SEOK

Examiner

Angel L. Casiano

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 July 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-21 is/are rejected.
- 7) ☒ Claim(s) 7 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 July 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 20030723.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

1. The present Office action is in response to application filed 23 July 2003.
2. Claims 1-21 are pending. All claims have been examined.

Information Disclosure Statement

3. The information disclosure statement (IDS) submitted was filed on 23 July 2003. Submission is in compliance with the provisions of 37 CFR 1.97. Accordingly, the information disclosure statement is being considered by the examiner.

Priority

4. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Claim Objections

5. Claim 7 is objected to because of the following informalities: "generate" is misspelled. Appropriate correction is required.

Claim Rejections - 35 USC § 102

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. Claims 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Jacobs et al. [US 6,279,056 B1].

Regarding claim 1, Jacobs et al. teaches a portable computer (see Figure 6) having a power switch (see “main power switch”; Abstract). The reference teaches an optical device drive (see “CD-ROM”; Abstract); an audio signal processing unit processing the audio data of a disk inserted into the optical device drive (see Figure 2); and an inputting unit comprising a plurality of selection buttons (see Figure 5; col. 2, lines 46-52; col. 6, lines 18-26; col. 9, lines 43-44). In addition, the reference teaches keycodes inputting and selecting functions (see col. 12, lines 35-37; “keyboard 48”, col. 3, line 67 to col. 4, line 1). Each selection button of the inputting unit has a selection inputting function in response to a plurality of operations of the optical device drive (see col. 2, line 35; col. 7, lines 39-41). The Jacobs et al. reference teaches supplying assistant power (see “selectively powering”, col. 2, lines 15-16) while system power is turned off (see “main power”, col. 4, lines 23-27). The audio unit controls the optical device drive based on selection by the selection button as inputted (see col. 9, lines 38-48).

Claim Rejections - 35 USC § 103

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary

skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. Claims 2-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al. [US 6,279,056 B1] in view of Shen [US 6,414,675 B1].

As for claim 2, Jacobs et al. teaches a plurality of inputting button (see col. 2, lines 22-42) switches generating selection signals when the respective selection buttons are pressed. However, the reference fails to teach a touch pad provided with a touch pad IC unit generating a pointing signal in response to the selection signal as generated by the plurality of inputting button switches. Shen teaches a personal computer (PC; Abstract) having a touch pad provided with an IC unit generating a pointing signal in response (see Figure 3). At the time of the invention, one of ordinary skill in the art would have been motivated to combine the cited disclosures in order to manipulate information in a personal computer, without requiring a booting process, offering “significant power-saving characteristics”, as taught by Shen (see col. 5, lines 1-5).

As for claim 3, Jacobs et al. teaches supplying selection signals based on an “ON” or “OFF” signal of the “main power” to the audio signal processing unit (see col. 2, lines 7-21).

As for claim 4, Jacobs et al. teaches supplying a selection signal generated in the input buttons based on the “ON” signal of the power switch (see “power switch 58”, col. 4, lines 36-42). However, Jacobs et al. fails to teach a touch pad provided with a touch pad IC unit generating a pointing signal in response to the selection signal as generated by the plurality of inputting button switches. Shen teaches a personal computer (PC; Abstract) having a touch pad provided with an IC unit generating a pointing signal in response (see Figure 3). At the time of

the invention, one of ordinary skill in the art would have been motivated to combine the cited disclosures, for the reasons stated in the rejection of claim 2.

As for claim 5, Jacobs et al. teaches supplying a selection signal generated in the input buttons based on the “OFF” signal of the power switch (see “audio CD mode” and “power switch 58”, col. 4, lines 59-42).

As for claim 6, Jacobs et al. teaches selectively powering and initializing hardware devices in the computer system (see col. 9, lines 53-55). The power is supplied to hardware devices based on the “ON” or “OFF” signals of the power switch (see “audio CD mode” and “unpowered” col. 10, lines 4-7). Although the reference does not explicitly cite a “microcomputer” as performing the power supply, it would have been obvious to one of ordinary skill in the art at the time the invention was made that a controller or processor would have been necessary for performing and executing the POST test in the computer system as taught by Jacobs et al. (see col. 9, line 53).

As for claim 7, The Jacobs et al. reference teaches supplying assistant power (see “selectively powering”, col. 2, lines 15-16) to the audio processing unit while system power is turned off (see “main power”, col. 4, lines 23-27).

Regarding claim 8, Jacobs et al. teaches a computer (see Figure 6) having a power switch (see “main power switch”; Abstract) to enable or disable system power. The reference teaches an optical device drive (see “CD-ROM”; Abstract); and an inputting unit comprising a plurality of selection buttons (see Figure 5; col. 2, lines 46-52; col. 6, lines 18-26; col. 9, lines 43-44). In addition, the reference teaches keycodes inputting and selecting functions (see col. 12, lines 35-37; “keyboard 48”, col. 3, line 67 to col. 4, line 1). Each selection button of the inputting unit

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has a selection inputting function in response to a plurality of operations of the optical device drive (see col. 2, line 35; col. 7, lines 39-41). The Jacobs et al. reference teaches supplying assistant power (see “selectively powering”, col. 2, lines 15-16) while system power is turned off (see “main power”, col. 4, lines 23-27). The audio unit controls the optical device drive based on selection by the selection button as inputted (see col. 9, lines 38-48). Jacobs et al. teaches supplying selection signals based on an “ON” or “OFF” signal of the “main power” to the audio signal processing unit (see col. 2, lines 7-21) and a bus controller, which is unpowered if the computer system’s main power is OFF and the device is operating in “audio CD mode” (See col. 10, line 4). However, the reference fails to teach a touch pad provided with a unit. Shen teaches a personal computer (PC; Abstract) having a touch pad provided with a unit (see Figure 3). At the time of the invention, one of ordinary skill in the art would have been motivated to combine the cited disclosures in order to manipulate information in a personal computer, without requiring a booting process, offering “significant power-saving characteristics”, as taught by Shen (see col. 5, lines 1-5).

As for claim 9, Jacobs et al. teaches a plurality of input buttons (see Figure 5).

As for claim 10, Jacobs et al. teaches controlling a CD-ROM drive that plays audio compact discs (CDs) (see col. 9, lines 21-24).

As for claim 11, Jacobs et al. discloses input of playback instructions for the audio CDs when a signal is supplied to the optical device driver (see col. 7, lines 39-41).

As for claim 12, the combination of references does not explicitly teach a DVD drive that plays digital versatile discs (DVDs). However, the combination teaches an optical drive (see Fig. 2). At the time of the invention, it would have been obvious to one of ordinary skill in the

art that optical drives often include compact disc (CD), digital video disc (DVD), compact disc read write (CDRW) and DVD/CDRW drives.

As for claim 13, Jacobs et al. discloses input of playback instructions for the audio CDs when a signal is supplied to the optical device driver (see col. 7, lines 39-41). Nonetheless, the combination of references does not explicitly teach a DVD drive that plays digital versatile discs (DVDs). At the time of the invention, it would have been obvious to one of ordinary skill in the art that optical drives often include compact disc (CD), digital video disc (DVD), compact disc read write (CDRW) and DVD/CDRW drives.

Regarding claim 14, this corresponds to the method for implementing the computer having an optical device drive, as disclosed in claim 8. The combination of references as exposed above, teaches or suggests the limitations corresponding to the claimed computer. Therefore, the combination of references teaches the limitations directed to the method. This claim is rejected under the same rationale.

As for claims 15-18, these correspond to the method for implementing the computer having an optical device drive, as disclosed in claims 10-13. The combination of references as exposed above, teaches or suggests the limitations corresponding to the claimed computer. Therefore, the combination of references teaches the limitations directed to the method. These claims are rejected under the same rationale.

Regarding claim 19, this corresponds to the machine-readable medium for implementing the computer having an optical device drive, as disclosed in claim 8. The combination of references as exposed above, teaches or suggests the limitations corresponding to the claimed

computer. Therefore, the combination of references teaches the limitations directed to the machine-readable medium. This claim is rejected under the same rationale.

As for claims 20-21, these correspond to the machine-readable medium for implementing the computer having an optical device drive, as disclosed in claims 10-11. The combination of references as exposed above, teaches or suggests the limitations corresponding to the claimed computer. Therefore, the combination of references teaches the limitations directed to the machine-readable medium. These claims are rejected under the same rationale.

Conclusion

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

- Tanaka [JP 09320251 A] teaches power supply switching controller e.g. for CD player, digital tape recorder, record player, LD player - switches power supply into OFF state, when input signal contains mismatched address information.
- Jacobs et al. [US 6006285 A] teaches a computer system capable of playing audio CDs in a CD-ROM drive independent of an operating system.
- Klein [US 6412075 B1] teaches a portable computer with low power CD-player mode.
- Kou [US 6868460 B1] teaches an apparatus comprising: a micro-controller; a CAROM controller coupled to the micro-controller and to a CD drive interface to directly access a file system in a CD-ROM and read files while a computer is in any one of a sleep mode, power off mode, and suspend mode; a bypass circuit coupled to the CD drive interface and to a computer interface allowing the computer to control and access the CD-ROM when the computer is in power on mode; and a reprogrammable on-chip DSP coupled to

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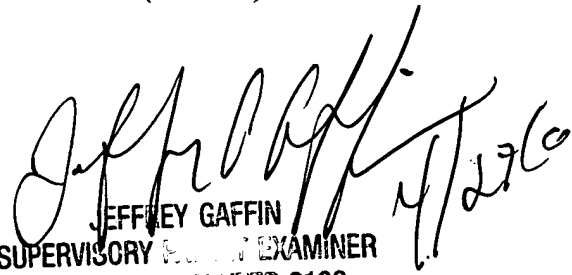
the micro-controller to decode and process audio files from the CD-ROM independently from the computer, wherein the micro-controller controls the access to the CD-ROM and performs user interface functions.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Angel L. Casiano whose telephone number is 571-272-4142. The examiner can normally be reached on 9:00-5:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jeffrey Gaffin can be reached on 571-272-4146. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Alc
28 April 2005


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